

CLINICAL CASE

Neck mass with infrequent origin

Fernando López-Álvarez,* José L. Llorente-Pendás, Vanessa Suárez-Fente, Carlos Suárez-Nieto

Servicio de Otorrinolaringología, Hospital Universitario Central de Asturias, Oviedo, Principado de Asturias, Spain

Received November 30, 2009; accepted December 3, 2009

KEYWORDS

Cervical mass;
Prostate;
Metastasis

PALABRAS CLAVE

Masa cervical;
Próstata;
Metástasis

Abstract We report the case of a 67-year-old male diagnosed with prostate adenocarcinoma, who referred dysphagia, dysphonia and noticed the appearance of a laterocervical mass. A CT scan revealed an osteolytic soft tissue neck lesion, which was resected. Its anatomical-pathological study was compatible with metastasis of prostate adenocarcinoma.

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Masa cervical de origen infrecuente

Resumen Varón de 67 años de edad diagnosticado de adenocarcinoma de próstata que refiere disfagia, disfonía y la aparición de una masa laterocervical. En una tomografía computarizada se aprecia una lesión cervical de partes blandas, osteolítica, la cual es reseada y cuyo estudio anatomopatológico fue compatible con metástasis de adenocarcinoma de próstata.

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Clinical case

Case history

Male, 67 years old, who complained of generalised bone pain and was diagnosed with prostate adenocarcinoma with bone metastases. He then underwent surgery and radiotherapy, obtaining a good response and disappearance of pain.

Two years after diagnosis, a cervical soft tissue injury was observed in an image control and the patient began to display dysphagia, moderate dysphonia and referred the emergence of a right laterocervical mass.

Physical exploration

The oral cavity and oropharynx showed no abnormalities. The nasofibroscope showed a slight protrusion of the posterior and right lateral wall of the hypopharynx, with normal mucosa and without airway involvement. The mobility of the vocal cords was preserved. Cervical palpation revealed a mass at the left IV level.

*Corresponding author.

E-mail address: flopez1981@yahoo.es (F. López-Álvarez).

Complementary tests

- *Cervical computed tomography (CT)*: osteolytic tumour at the C6 level with vertebral soma destruction, plus a large prevertebral 4x6cm soft tissue mass that displaced the pharyngolaryngeal structures forward and right. Multiple millimetric laterocervical adenopathies were also observed on both lymph node chains (Figure 1).

Treatment

Given the suspicion of neoplasm and the possibility of developing spinal involvement, we decided to perform surgery through a left transcervical approach. A 9x5 cm tumour and debris from discs and vertebrae at the C6 level were removed (Figure 2A). Simultaneously, an expanded 5 mm intersomatic titanium implant was placed, with C5-C7 fixation, to ensure stability of the cervical spine (Figure 2B).

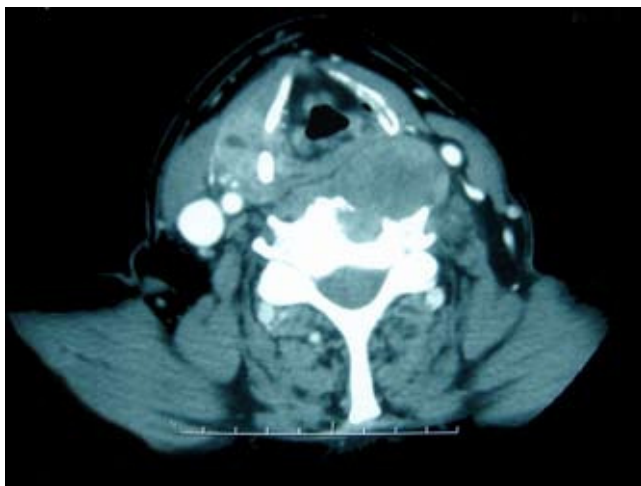


Figure 1 Cervical CT. Prevertebral lesion, isodense, eroding the vertebral body and bulging into the posterior hypopharynx wall.

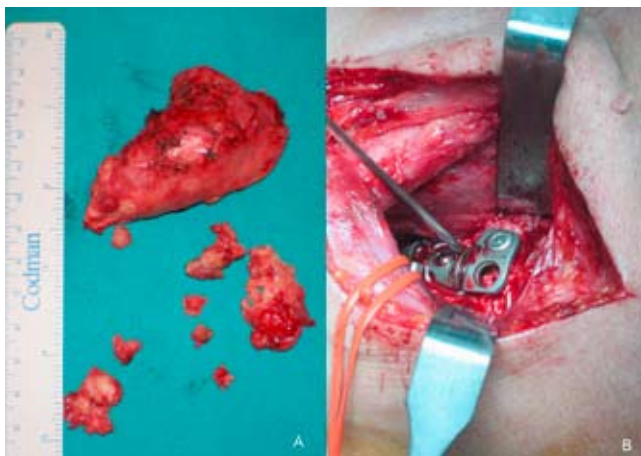


Figure 2 A) Surgical specimen. Hard tumour with debris from discs and the vertebral body. B) Spinal fixation after tumour resection.

Diagnosis

The anatomopathological study revealed: adenocarcinoma with papillary and pseudopapillary formations of low-grade malignancy with a probable prostatic origin.

Evolution

Evolution was favourable after surgery, with disappearance of pharyngolaryngeal symptoms and absence of neurological deficit symptoms.

Two years after surgery, a whole body CT scan was carried out due to the reappearance of widespread pain. The scan showed a left laterocervical neck mass that crossed the middle line and was located within the vascular axis; the mass affected the left internal jugular vein and compressed the airway, with rotation of the larynx. At the thoracic level, metastatic lesions were found in both lungs, as well as hilar lymphadenopathy and a right paravertebral mass. Puncture of the latter revealed adenocarcinoma metastasis. At the abdominal level, there were retroperitoneal metastatic lesions in both suprarenal glands and the lumbar spine.

Given this clinical situation, it was decided to administer radiation therapy at the lumbar level with palliative and analgesic intent. The response was good and, at present, the patient has stable, controlled symptoms.

Discussion

The development of bone metastases in the cervical spine is rare and the most common primary tumour location is the lung for men and the breast for women. The development of cervical bone metastasis usually debuts with severe regional pain, insensitive to common pain treatments and even morphine, and may progress to neurological symptoms. Neurological involvement, given the level of the lesion, can cause motor deficits, even reaching paraplegia. In most cases, the patient dies within a few days or weeks.

The development of bone metastases is common in prostate adenocarcinoma and the most common location is the lumbar spine. In these patients, the prognosis is worse but they are still potentially curable if the extension is limited.¹

However, supradiaphragmatic bone metastasis is rare (0.4%-1%) and carries a very poor prognosis, with survival of only a few months.² although the disease is incurable, when such metastases appear, it is recommended to carry out palliative treatment in an attempt to control pain and symptoms of neurological compression. This treatment may be radiotherapy (with flashes) or in some cases in which spinal stability is affected, ablative surgery would be indicated, as in our case. This also allowed us to control the compression symptoms of the aerodigestive tract that this patient presented, in addition to securing and stabilising the cervical spine, thus improving quality of life for the patient.^{3,4}

Although cervical spinal metastasis of prostate tumours is rare, the otolaryngologist should consider this possibility in the differential diagnosis of neck masses. Palliative rescue surgery may be indicated in selected cases, with or without spinal stabilisation.

References

1. Morris MJ, Scher HI. Clinical Approaches to Osseous Metastases in Prostate Cancer. *Oncologist*. 2003;8:161-73.
2. Cheng L, Zincke H, Blute ML, Bergstralh EJ, Scherer B, Bostwick DG. Risk of prostate carcinoma death in patient with lymph node metastasis. *Cancer*. 2001;91:66-73.
3. Heary RF, Bono CM. Metastatic Spinal Tumors. *Neurosurgical Focus*. 2001;11:e1.
4. Storey JA, Torti FM. Bone metastases in prostate cancer: a targeted approach. *Curr Opin Oncol*. 2007;19:254-8.